This listing of claims will replace all prior versions and listings of claims in the application:

Listing of Claims

1. (previously presented) A power distribution/generation system for supplying electrical power to a number of sites, at least some of the sites comprising a generator, at least some of which are Stirling engines capable of generating electrical power, the generators being linked together on a local network, the local network being connectable to an external power grid, and a controller to control the distribution of power so that a site is supplied with electrical power from the local network if its demand exceeds the power generated by that site's generator, and so that power is drawn from the grid if the total power demand of all of the sites exceeds the power generated by all of the generators.

2. (original) A system according to claim 1, wherein the Stirling engine is a linear free piston Stirling engine.

3. (currently amended) A system according to ~~any one of the preceding claims~~ claim 1, wherein the controller is arranged to export excess power to the grid if the power generated exceeds the power demand of the local network.

4. (currently amended) A system according to ~~any one of the preceding claims~~ claim 1, wherein all of the generators in the local network are routed through a hub which is then connected to the grid.

5. (currently amended) A system according to ~~any one of the preceding claims~~ claim 1, further comprising means to detect the absence of mains power, wherein the controller is arranged to operate in the absence of mains power to supply electrical power to selected electricity consuming apparatus.

6. (original) A system according to claim 5, wherein the controller is arranged, upon detection of the absence of mains power to selectively supply electrical power to certain designated emergency sockets within a site.

7. (original) A system according to claim 6, further comprising means to detect excess power demand, and to trim the peak voltage supplied to the selected sockets for a predetermined period of time.

8. (currently amended) A system according to ~~any one of the preceding claims~~ claim 1, wherein the cables which carry the power to and from each site are also used as a carrier for the communication signals between the sites.

9. (currently amended) A system according to ~~any one of the preceding claims~~ claim 1, further comprising a power store in communication with at least one of those sites that has a generator, the power store being arranged to receive and store a proportion of the power generated by at least some of the generators with which it communicates for later distribution back to sites within the local network.

10. (original) A system according to claim 9, wherein the controller is further configured to control the distribution of power so that a first site is supplied with electrical power from other generators within the local network, and/or the power store within the local network, if the demand at the first site exceeds the power generated by the generator at that first site, so that power is drawn from the power store if the total power demand of all of the sites exceeds the power generated by all of the generators, and so that power is drawn from the grid if the total power demand of all of the sites exceeds the power generated by all of the generators and that power available from the power store.

11. (currently amended) The system of claim 9 ~~or claim 10~~, wherein the power store is selected from the list comprising a battery, a flywheel, pumped storage and superconducting magnetic storage.

12. (currently amended) ~~A method for supplying electrical power to a number of sites using a system according to any one of the preceding claims, the method~~ In a power distribution/generation system for supplying electrical power to a number of sites, at least some of the sites comprising a generator, at least some of which are Stirling engines capable of generating electrical power, the generators being linked together on a local network, the local network being connectable to an external power grid, and a controller to control the distribution of power, a method comprising the steps of monitoring the power generated by each generator[[,]];

monitoring the power demand at each site[[,]]; and

controlling the distribution of power so that a site is supplied with electrical power from the local network if its demand exceeds the power generated by that site's generator, and drawing power from the grid if the total power demand of all of the sites exceeds the power generated by all of the generators.

13. (original) The method of claim 12, further comprising receiving and storing a proportion of the power generated by at least some of the generators; and subsequently distributing the stored power back to the sites within the local network in response to an increased demand for power.

14. (new) A power distribution/generation system for supplying electrical power to a number of sites, at least some of the sites comprising a generator, at least some of which are Stirling engines capable of generating heat and electrical power, the heat generated by each Stirling engine being supplied to its respective site only, the generators being linked together on a local network, the local network being connectable to an external power grid, and a controller to control the distribution of power so that a site is supplied with electrical power from the local network if its demand exceeds the power generated by that site's generator, so that power is drawn from the grid if the total power demand of all of the sites exceeds the power generated by all of the generators, and so that the power outputs of the generators on the network are adjusted to maintain the local network voltage within preset limits, save that the power output of a Stirling engine on the network is not reduced, where to do so would result in a reduction in the desired heat output from the Stirling engine at that site, below a demanded level there.